

	English/Language Arts	Mathematics	Social Studies
<b>ACTIVITY</b>			
Check It Out! (3)	k.4.3, k.5.1, k.7.1,	k.1.9, k.6.1, k.6.2	k.3.6
Idea Pools (7)	k.1.3, k.2.4, k.4.1, k.4.2, k.4.3, k.5.1, k.7.4, k.7.5	k.1.9	k.1.4
Let's Work Together (9)	k.4.2, k.4.3, k.7.1, k.7.2, k.7.5	k.6.1, k.6.3	k.5.2
Water Log (19)	k.5.1, k.7.1, k.7.2, k.7.5	k.1.9, k.6.2	k.3.6
Molecules In Motion (47)	k.4.3, k.5.1, k.7.1, k.7.2, k.7.5	k.1.9, k.6.1	k.1.4, k.3.4
Water Match (50)	k.7.1	k.3.1, k.6.2	k.3.6
Aqua Bodies (63)	k.5.1, k.7.1	k.1.9, k.5.1, k.6.1, k.6.2	k.3.5
Aqua Notes (66)	k.3.2, k.7.1, k.7.4	k.1.9	k.3.1, k.5.1
Life Box (76)	k.7.1, k.7.2	k.3.1, k.6.1	k.5.1
Water Address (122)	k.7.1, k.7.2	k.3.1, k.6.2	k.3.4
A House Of Seasons (155)	k.4.3, k.5.1, k.7.1, k.7.2	k.3.1, k.4.3, k.6.2	k.3.4
Poetic Precipitation (182)	k.1.10, k.2.3, k.5.1, k.7.1, k.7.4	k.1.9, k.6.2	k.1.4
Rainy Day Hike (186)	k.4.3, k.5.1, k.7.1, k.7.2, k.7.3, k.7.5	k.6.1, k.6.2	k.2.5, k.3.1
Stream Sense (191)	k.4.3, k.5.1, k.7.1, k.7.2, k.7.3	k.1.9, k.6.2	k.1.4, k.3.3
The Thunderstorm (196)	k.4.2, k.4.3, k.5.1, k.7.1, k.7.2, k.7.3, k.7.5	k.1.9, k.2.3, k.4.3, k.6.2	k.3.2, k.3.3, k.3.4
A-maze-ing Water (219)	k.4.3, k.5.1, k.7.1, k.7.2, k.7.3, k.7.5	k.1.9, k.4.3, k.6.1, k.6.2	k.1.4, k.3.1, k.3.3, k.3.6
Common Water (232)	k.4.1, k.4.3, k.5.1, k.7.1, k.7.2, k.7.3, k.7.5	k.6.1, k.6.2, k.6.3	k.1.1, k.2.4, k.3.3, k.3.4, k.3.5, k.3.6, k.5.1
A Drop In The Bucket (238)	k.4.3, k.5.1, k.7.1, k.7.2, k.7.3	k.5.1, k.6.2	k.3.2
Irrigation Interpretation (254)	k.7.1, k.7.2, k.7.3, k.7.5	k.1.9, k.6.2	k.1.4, k.3.4, k.3.5
The Long Haul (260)	k.7.1, k.7.2, k.7.3, k.7.5	k.5.1, k.6.2	k.1.1, k.4.3, k.4.4, k.5.4
Wet-Work Shuffle (360)	k.4.3, k.5.1, k.7.1, k.7.2, k.7.3	k.1.9, k.6.2	k.3.3, k.4.2, k.4.3
Choices And Preferences, Water Index (367)	k.4.3, k.5.1, k.7.1, k.7.2, k.7.3	k.1.9, k.6.2	k.1.4, k.3.3

Cold Cash In the Icebox (373)	k.4.3, k.5.1, k.7.1, k.7.2, k.7.3, k.7.5	k.1.9, k.5.1, k.6.1, k.6.2, k.6.3, k.6.4	k.1.1, k.1.4
Pass The Jug (392)	k.7.1, k.7.2, k.7.5	k.5.1, k.6.1, k.6.2, k.6.3	k.2.4, k.3.4
What's Happening? (425)	k.4.3, k.5.1, k.5.2, k.7.1, k.7.2, k.7.3	k.1.9, k.6.1, k.6.2, k.6.4	k.3.6
Water In Motion (450)	k.4.3, k.5.1, k.7.1, k.7.2, k.7.3	k.1.9, k.5.1, k.6.2	
Water Write (457)	k.2.5, k.2.3, k.3.1, k.4.3, k.5.1, k.7.1, k.7.2, k.7.5	k.1.9, k.6.2	k.1.4

## Kindergarten

### Standard 1

#### READING: Word Recognition, Fluency, and Vocabulary Development

*Students know about letters, words, and sounds. They apply this knowledge to read simple sentences.*

##### *Concepts About Print*

K.1.3 Understand that printed materials provide information.

**WET Activities (page):** 7

##### *Phonemic Awareness\**

K.1.10 Say rhyming words in response to an oral prompt.

Example: Say a word that rhymes with *cat*.

**WET Activities (page):** 182

### Standard 2

#### READING: Comprehension

*Students identify the basic facts and ideas in what they have read, heard, or seen. They use comprehension strategies, such as generating and responding to questions and comparing new information to what is already known, to understand what they read. The selections in the **Indiana Reading List** (available online at [www.doe.state.in.us/standards/readinglist.html](http://www.doe.state.in.us/standards/readinglist.html)) illustrate the quality and complexity of the materials to be read by students. In Kindergarten, students will listen to and begin to read grade-level-appropriate classic and contemporary literature, nursery rhymes, alphabet books, dictionaries, and online information.*

##### *Comprehension and Analysis of Grade-Level-Appropriate Text*

K.2.3 Connect the information and events in texts to life experiences.

Example: Tell about a trip to a farm after reading or listening to a book about a farm, such as *Going to Sleep on the Farm* by Wendy Lewison or *The Town Mouse and the Country Mouse: An Aesop Fable* by Janet Stevens.

**WET Activities (page):** 182, 457

K.2.4 Retell familiar stories.

Example: Retell the story of a folktale, such as the version of *The Three Little Pigs* by Steven Kellogg.

**WET Activities (page):** 7

K.2.5 Identify and summarize the main ideas and plot of a story.

Example: Listen to a folktale, such as the version of *The Little Red Hen* by Paul Galdone or *The Three Billy Goats Gruff* by Tim Arnold. Then, discuss with the class the main events of the story and the characters in the story. After listening to an information story that is read

aloud, such as *Bears, Bears, and More Bears* by Jackie Morris, tell about the main ideas that were learned.

**WET Activities (page):** 457

### Standard 3

#### **READING: Literary Response and Analysis**

*Students listen and respond to stories based on well-known characters, themes (the main idea of a story), plots (what happens in a story), and settings (where a story takes place). The selections in the **Indiana Reading List** (available online at [www.doe.state.in.us/standards/readinglist.html](http://www.doe.state.in.us/standards/readinglist.html)) illustrate the quality and complexity of the materials to be read by students.*

*Analysis of Grade-Level-Appropriate Narratives (Stories)*

K.3.1 Distinguish fantasy from reality.

Example: Listen to *The Day Jimmy's Boa Ate the Wash*, Trinka Hakes Noble's story about a class field trip to a farm, and *Farming*, Gail Gibbons' nonfiction book about farming. Tell how these two books are different.

**WET Activities (page):** 457

K.3.2 Identify types of everyday print materials.

Example: Walk around the school and identify the signs in the school, such as EXIT, Principal's Office, and Restrooms. Tell the difference between a storybook and a beginners' dictionary.

**WET Activities (page):** 66

### Standard 4

#### **WRITING: Process**

*Students discuss ideas and tell stories for someone to write. Students use pictures, letters, and words to write.*

*Organization and Focus*

K.4.1 Discuss ideas to include in a story.

**WET Activities (page):** 7, 232

K.4.2 Tell a story that the teacher or some other person will write.

**WET Activities (page):** 7, 9, 196

K.4.3 Write using pictures, letters, and words.

**WET Activities (page):** 3, 7, 9, 47, 155, 186, 191, 196, 219, 232, 238, 360, 367, 373, 425, 450, 457

### Standard 5

#### **WRITING: Applications (Different Types of Writing and Their Characteristics)**

*In Kindergarten, students begin to write and draw pictures for specific purposes and for a specific audience (intended reader).*

- K.5.1 Draw pictures and write words for a specific reason.  
Example: Draw a picture or write to a friend or a family member to tell about something new at school.

**WET Activities (page):** 3, 7, 19, 47, 63, 155, 182, 186, 191, 196, 219, 232, 238, 360, 367, 373, 425, 450, 457

- K.5.2 Draw pictures and write for specific people or persons.  
Example: Write or dictate an invitation to a parent to attend a classroom event.

**WET Activities (page):** 425

## **Standard 7**

### **LISTENING AND SPEAKING: Skills, Strategies, and Applications**

*Students listen and respond to oral communication. They speak in clear and coherent sentences. Students deliver brief oral presentations about familiar experiences or interests.*

#### *Comprehension*

- K.7.1 Understand and follow one- and two-step spoken directions.

**WET Activities (page):** 3, 9, 19, 47, 50, 63, 66, 76, 122, 155, 182, 186, 191, 196, 219, 232, 238, 254, 260, 360, 367, 373, 392, 425, 450, 457

#### *Oral Communication*

- K.7.2 Share information and ideas, speaking in complete, coherent sentences.

**WET Activities (page):** 9, 19, 47, 76, 122, 155, 186, 191, 196, 219, 232, 238, 254, 260, 360, 367, 373, 392, 425, 450, 457

#### *Speaking Applications*

- K.7.3 Describe people, places, things (including their size, color, and shape), locations, and actions.

**WET Activities (page):** 186, 191, 196, 219, 232, 238, 254, 260, 360, 367, 373, 425, 450

- K.7.4 Recite short poems, rhymes, and songs.

**WET Activities (page):** 7, 66, 182

- K.7.5 Tell an experience or creative story in a logical sequence.

**WET Activities (page):** 7, 9, 19, 47, 186, 196, 219, 232, 254, 260, 373, 392, 457

## Kindergarten

*In this technological age, mathematics is more important than ever. When students leave school, they are more and more likely to use mathematics in their work and everyday lives — operating computer equipment, planning timelines and schedules, reading and interpreting data, comparing prices, managing personal finances, and completing other problem-solving tasks. What they learn in mathematics and how they learn it will provide an excellent preparation for a challenging and ever-changing future.*

*The state of Indiana has established the following mathematics standards to make clear to teachers, students, and parents what knowledge, understanding, and skills students should acquire in Kindergarten:*

### **Standard 1 — Number Sense**

Understanding the number system is the basis of mathematics. Students develop this understanding by first comparing the number of objects (such as blocks) in a given set. From comparing sets of objects, they develop the concept of counting: matching each object in a set with a counting number. Then they use counting to recognize, name, and order up to ten objects. As preparation for learning about fractions, students practice dividing sets into equal groups and shapes into equal parts.

### **Standard 2 — Computation**

Fluency in computation is essential. As students learn about numbers, they also learn how to add and subtract them. They use objects to join sets together (for addition) and to remove objects from sets (for subtraction).

### **Standard 3 — Algebra and Functions**

Algebra is a language of patterns, rules, and symbols. Students at this level sort and classify objects according to various rules and make simple patterns with numbers and shapes.

### **Standard 4 — Geometry**

Students learn about geometric shapes and develop a sense of space. They identify and describe simple shapes, comparing and sorting them by such attributes as size and roundness. They learn the meaning of words, like inside and above, that relate to positions in space.

### **Standard 5 — Measurement**

The study of measurement is essential because of its uses in many aspects of everyday life. Students begin their study of measurement by comparing objects' length, weight, temperature, etc. They use words like shorter, taller, heavier, and colder. They also learn concepts of time, such as hours, days, months, and years.

### **Standard 6 — Problem Solving**

In a general sense, mathematics is problem solving. In all mathematics, students use problem-solving skills: they choose how to approach a problem, they explain their reasoning, and they check their results. As they develop their skills with numbers, geometry, or measurement, for example, students at this level move from simple ideas to more complex ones by taking logical steps that build a better understanding of mathematics.

*As part of their instruction and assessment, students should also develop the following learning skills by Grade 12 that are woven throughout the mathematics standards:*

## **Communication**

The ability to read, write, listen, ask questions, think, and communicate about math will develop and deepen students' understanding of mathematical concepts. Students should read text, data, tables, and graphs with comprehension and understanding. Their writing should be detailed and coherent, and they should use correct mathematical vocabulary. Students should write to explain answers, justify mathematical reasoning, and describe problem-solving strategies.

## **Reasoning and Proof**

Mathematics is developed by using known ideas and concepts to develop others. Repeated addition becomes multiplication. Multiplication of numbers less than ten can be extended to numbers less than one hundred and then to the entire number system. Knowing how to find the area of a right triangle extends to all right triangles. Extending patterns, finding even numbers, developing formulas, and proving the Pythagorean Theorem are all examples of mathematical reasoning. Students should learn to observe, generalize, make assumptions from known information, and test their assumptions.

## **Representation**

The language of mathematics is expressed in words, symbols, formulas, equations, graphs, and data displays. The concept of one-fourth may be described as a quarter,  $\frac{1}{4}$ , one divided by four, 0.25,  $\frac{1}{8} + \frac{1}{8}$ , 25 percent, or an appropriately shaded portion of a pie graph. Higher-level mathematics involves the use of more powerful representations: exponents, logarithms,  $\pi$ , unknowns, statistical representation, algebraic and geometric expressions. Mathematical operations are expressed as representations: +, =, divide, square. Representations are dynamic tools for solving problems and communicating and expressing mathematical ideas and concepts.

## **Connections**

Connecting mathematical concepts includes linking new ideas to related ideas learned previously, helping students to see mathematics as a unified body of knowledge whose concepts build upon each other. Major emphasis should be given to ideas and concepts across mathematical content areas that help students see that mathematics is a web of closely connected ideas (algebra, geometry, the entire number system). Mathematics is also the common language of many other disciplines (science, technology, finance, social science, geography) and students should learn mathematical concepts used in those disciplines. Finally, students should connect their mathematical learning to appropriate real-world contexts.

## Standard 1

### Number Sense

*Students understand the relationship between numbers and quantities up to 10, and that a set\* of objects has the same number in all situations regardless of the position or arrangement of the objects.*

- K.1.9 Record and organize information using objects and pictures.  
Example: Ask some of your friends what pets they have. Use pictures of animals to show the number of pets your friends have.

\* set: a collection of objects, numbers, etc.

\* whole number: 0, 1, 2, 3, etc.

**WET Activities (page):** 3, 7, 19, 47, 63, 66, 182, 191, 196, 219, 254, 360, 367, 373, 425, 450, 457

## Standard 2

### Computation

*Students understand and describe simple additions and subtractions.*

- K.2.3 Describe addition and subtraction situations (for numbers less than 10).  
Example: In the last example, explain what operation you were using when you took away crayons from the pile.

**WET Activities (page):** 196

## Standard 3

### Algebra and Functions

*Students sort and classify objects.*

- K.3.1 Identify, sort, and classify objects by size, number, and other attributes. Identify objects that do not belong to a particular group.  
Example: Find the squares in a collection of shapes. Sort these squares into large ones and small ones and explain how you decided which squares went in each pile.

**WET Activities (page):** 50, 76, 122, 155

## Standard 4

### Geometry

*Students identify common objects around them and describe their geometric features and position.*

- K.4.3 Identify and use the terms: *inside*, *outside*, *between*, *above*, and *below*.  
Example: Tell when a block is inside or outside a box.

**WET Activities (page):** 155, 196, 219

## Standard 5

### Measurement



*Students understand the concept of time and units to measure it. They understand that objects have length, capacity, weight, and temperature, and that they can compare objects using these qualities.*

- K.5.1 Make direct comparisons of the length, capacity, weight, and temperature of objects and recognize which object is shorter, longer, taller, lighter, heavier, warmer, cooler or holds more.  
Example: Hold two books side by side to see which is shorter. Hold one in each hand to see which is heavier.

**WET Activities (page):** 63, 238, 269, 373, 392, 450

## **Standard 6**

### **Problem Solving**

*Students make decisions about how to set up a problem.*

- K.6.1 Choose the approach, materials, and strategies to use in solving problems.  
Example: Solve the problem: “There are four blocks on the table and a box of blocks that is closed. The teacher says that there are five blocks in the box. Find the number of blocks in all, without opening the box.” Decide to draw a picture.

**WET Activities (page):** 3, 9, 47, 63, 76, 186, 219, 232, 373, 392, 425

- K.6.2 Use tools such as objects or drawings to model problems.  
Example: In the first example, draw a picture of the four blocks that you can see, and then draw five more blocks for the ones that you cannot see.

**WET Activities (page):** 3, 19, 50, 63, 122, 155, 182, 186, 191, 196, 219, 232, 238, 254, 260, 360, 367, 373, 392, 425, 450, 457

*Students solve problems in reasonable ways and justify their reasoning.*

- K.6.3 Explain the reasoning used with concrete objects and pictures.  
Example: In the first example, count the number of blocks that you have drawn and write the number that represents the total.

**WET Activities (page):** 9, 232, 373, 392

- K.6.4 Make precise calculations and check the validity of the results in the context of the problem.  
Example: In the first example, open the box of blocks and place them on the table. Count the total number of blocks on the table to see whether your drawing was correct.

**WET Activities (page):** 373, 425

# KINDERGARTEN

## *Living and Learning Together*

*In Kindergarten, students learn about their environment as they begin to distinguish events of the past from the present and begin the development of citizenship, thinking skills, and participation skills.*

*The Indiana's K – 8 academic standards for social studies are organized around five content areas. The content area standards and the types of learning experiences they provide to students in Kindergarten are described below. On the pages that follow, age-appropriate concepts are listed underneath each standard. Skills for thinking, inquiry, and participation in a democratic society are integrated throughout. Specific terms are defined and examples are provided when necessary.*

### **Standard 1 — History**

Students examine the connections of their own environment with the past, begin to distinguish between events and people of the past and the present, and use a sense of time in classroom planning and participation.

### **Standard 2 — Civics and Government**

Students learn that they are citizens of their school, community, and country; identify symbols of the state and nation; understand examples of responsible citizenship; follow school rules; and know why rules are needed for order and safety.

### **Standard 3 — Geography**

Students learn that maps and globes are different ways of representing Earth's surface and begin to explore the geographic characteristics of their homes, school, and community.

### **Standard 4 — Economics**

Students explain how people do different jobs and work to meet basic economic wants.

### **Standard 5 — Individuals, Society, and Culture**

Students identify themselves as individuals who interact with other individuals and groups, including the family, school, and community; and identify ways that people, who are similar and different, make up the community.

### **Standard 1**

#### **History**

*Students examine the connections of their own environment with the past, begin to distinguish between events and people of the past and the present, and use a sense of time in classroom planning and participation.*

#### *Historical Knowledge*

- K.1.1 Compare people, objects, and events of today and long ago.  
Example: Compare objects of the past and present, such as a butter churn and a mixer; compare clothing, houses, and transportation of the past with the present.

**WET Activities (page):** 232, 260, 373

## *Chronological Thinking*

- K.1.4 Identify and order events that take place in a sequence.  
Example: Identify events in the school day as first, next, last; list the day's classroom activities in order; place events, such as birthdays, in order; use a calendar to identify national holidays and historical events.\

**WET Activities (page):** 7, 47, 182, 191, 219, 254, 367, 373, 457

## **Standard 2** **Civics and Government**

*Students learn that they are citizens of their school, community, and country; identify symbols of the state and nation; understand examples of responsible citizenship; follow school rules; and know why rules are needed for order and safety.*

### *Roles of Citizens*

- K.2.4 Identify examples of responsible citizenship in the school setting and in stories about the past and present.

**WET Activities (page):** 232, 392

- K.2.5 Identify and follow school rules to ensure order and safety.

**WET Activities (page):** 186

## **Standard 3** **Geography**

*Students learn that maps and globes are different ways of representing Earth's surface and begin to explore the geographic characteristics of their homes, school, and community.*

### *The World in Spatial Terms*

- K.3.1 Use words related to location, direction, and distance, including *here/there*, *over/under*, *left/right*, and *up/down*.

**WET Activities (page):** 66, 186, 219

- K.3.2 Identify maps and globes as ways of representing Earth and identify map symbols for land and water.

**WET Activities (page):** 196, 238

### *Places and Regions*

- K.3.3 Describe people and places in the school and community.  
Example: People in the school might include school workers; places might include the cafeteria, office, and gym. People in the community might include firefighters; places might include the fire station.

**WET Activities (page):** 191, 196, 219, 232, 360, 367

### *Physical Systems*

- K.3.4 Give examples of seasonal weather changes and describe how seasonal changes affect people and the environment.  
Example: In different seasons, people wear different kinds of clothing.  
**WET Activities (page):** 47, 122, 155, 196, 232, 254, 392

#### *Human Systems*

- K.3.5 Describe simple differences and similarities between ways people live in cities and on farms.  
**WET Activities (page):** 63, 232, 254

#### *Environment and Society*

- K.3.6 Recommend ways that people can help keep their environment clean.  
**WET Activities (page):** 3, 19, 50, 219, 232, 425

### **Standard 4 Economics**

*Students explain how people do different jobs and work to meet basic economic wants.*

- K.4.2 Identify different kinds of jobs that people do.  
Example: Picture books and stories illustrate and identify different types of jobs, as well as tools and clothing used in different jobs.  
**WET Activities (page):** 360
- K.4.3 Explain why people in a community have different jobs.  
Example: People may have different types of jobs because they like doing different things, or because they are better at doing one particular type of job.  
**WET Activities (page):** 260, 360
- K.4.4 Give examples of work activities that people do at home.  
**WET Activities (page):** 260

### **Standard 5 Individuals, Society, and Culture**

*Students identify themselves as individuals who interact with other individuals and groups, including the family, school, and community; and identify ways that people, who are similar and different, make up the community.*

- K.5.1 Identify ways in which people are alike and different.  
Example: Identify qualities, such as interests, hobbies, skills, and experiences, which make individuals unique.  
**WET Activities (page):** 66, 76, 232
- K.5.2 Identify individuals who are important in students' lives — such as parents, grandparents, guardians, and teachers — and give examples of how families cooperate and work together.  
**WET Activities (page):** 9

K.5.4 Identify and compare similarities and differences in families in other places and cultures.  
Example: Use picture books and stories to show the similarities and differences in houses, clothing, work, and celebrations.

**WET Activities (page):** 260